

IN THE CLAIMS

Cancel claim 1.

1. (Cancelled)

2. (Previously Amended) A network as claimed in claim 17 wherein said expert evaluation system uses said modified expert rule to devise a measurement protocol.

3. (Original) A network as claimed in claim 2 wherein said expert system devises said measurement protocol for a selected pathology.

4. (Original) A network as claimed in claim 2 wherein said expert evaluation system automatically devises said measurement protocol.

5. (Original) A network as claimed in claim 2 further comprising a memory containing a plurality of measurement protocols accessible by said remote server, and wherein each point of care test device accesses said memory, via said data link, to obtain a selected measurement protocol for performing said diagnostic testing.

6. (Original) A network as claimed in claim 5 wherein said measurement protocol is for a specific pathology and employs a predetermined number of said biomolecular markers.

7. (Previously amended) A network as claimed in claim 6 wherein said biochips are sensitive for more biomolecular markers than said predetermined number of biomolecular markers, and wherein each point of care test device conducts said diagnostic testing using all of the biomolecular markers in the sample of the tested biochip to obtain augmented testing data, and wherein each point of care test device includes said augmented testing data in said raw point of care data.

8. (Previously amended) A network as claimed in claim 17 wherein said point of care date entry stations comprise means for entering patient history data into said electronic patient record characterizing whether said diagnostic result was a false positive, a false negative or correct.

Cancel claim 9.

9. (Cancelled)

10. (Previously amended) A method as claimed in claim 18 wherein the step of creating a modified expert rule comprises creating a modified expert rule for devising a measurement protocol.

11. (Previously amended) A method as claimed in claim 10 wherein the step of creating a modified rule comprises creating a modified rule for a measurement protocol for a selected pathology.

12. (Previously amended) A method as claimed in claim 10 wherein the step of creating a modified rule comprises automatically creating a modified rule for said measurement protocol.

13. (Original) A method as claimed in claim 10 comprising storing a plurality of measurement protocols in a memory accessible from said remote server, and wherein the step of performing diagnostic testing in each point of care test device comprises establishing a data communication between a point of care test device and said memory to obtain a selected measurement protocol from said memory for use in said point of care test device for performing said diagnostic testing.

14. (Original) A method as claimed in claim 13 wherein each of said measurement protocol employs a predetermined number of said biomolecular markers.

15. (Original) A method as claimed in claim 14 comprising providing more biomolecular markers in each sample than said predetermined number and wherein the step of performing diagnostic testing includes performing diagnostic testing using said selected measurement protocol and also employing additional biomolecular markers in the sample of the tested biochip, beyond said predetermined number, to obtain augmented testing data, and including said augmented testing data in said raw point of care data.

16. (Previously amended) A method as claimed in claim 18 comprising obtaining said follow-up data by conducting a follow-up examination of the tested patient to determine follow-up data indicating whether said test result was a false positive, a false negative or correct.

17. (Previously added) A network for creating a modified diagnostic expert rule, comprising:

a plurality of disposable biochips, each sensitive for multiple biomolecular markers, respectively for a plurality of patients, each biochip containing a patient sample with multiple biomolecular markers;

a plurality of point of care test devices respectively at a plurality of point of care sites, each point of care test device receiving at least one of said biochips, as a tested biochip, and performing diagnostic testing on the sample in said tested biochip to obtain raw point of care data;

an expert system to which said raw point of care data is entered, as an input, for producing a diagnostic result from said expert system using an expert rule;

a plurality of electronic patient records respectively for said patients;

a plurality of point of care data entry stations respectively having access to at least one of said electronic patient records and respectively in communication with said point of care test devices, each data entry station including means for entering follow-up diagnostic data into the electronic patient record for the patient, as a tested patient, who provided the test sample in the tested biochip;

a remote server and an evaluation system accessible by said remote server; said remote server having at least one data link to each point of care test device and each electronic patient record, for transmitting said point of care raw data of said patient and an identification of said expert rule used to produce said diagnostic result, and said follow-up diagnostic data, to said remote server; and

said evaluation system creating a modified expert rule with improved diagnostic value in comparison to said expert rule used to produce said diagnostic result, using all of said point of care raw data and all of said follow-up diagnostic data as a training data set.

Claim 18 has been amended as follows:

18. (Currently amended) A method for creating a modified diagnostic expert rule, comprising the steps of:

obtaining a plurality of samples respectively from a plurality of patients and storing the samples respectively in a plurality of disposable biochips, each biochip being sensitive for multiple biomolecular markers;

providing a plurality of point of care test devices respectively at a plurality of point of care sites;

respectively receiving said biochips in said point of care test devices, each as a tested biochip, and in each point of care test device performing diagnostic testing on the sample in the tested biochip to obtain raw point of care data;

entering the raw point of care data as an input to an expert system and producing a diagnostic result with said expert system using an expert rule;

providing a remote server at a location remote from said point of care sites; \sites;

supplying the raw point of care data and an identification of said expert rule from all of the point of care sites, and the follow-up diagnostic data, to said remote server; and

at said remote server, creating a modified expert rule with improved diagnostic value compared to said expert rule used to produce said diagnostic result, using all of said point of care data and all of said follow-up diagnostic data as a training data set.